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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/554,113	08/21/2006	Amir Sa'ar	SA'AR1 9434	
	7590 04/09/200 D NEIMARK, P.L.L.C	EXAMINER		
624 NINTH ST		WILSON, SCOTT R		
SUITE 300 WASHINGTOI	N, DC 20001-5303		ART UNIT	PAPER NUMBER
			2826	
			MAIL DATE	DELIVERY MODE
			04/09/2009	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

	Applica	ion No.	Applicant(s)				
Office Action Summary		113	SA'AR ET AL.				
		er	Art Unit				
		R. WILSON	2826				
The MAILING DATE of this commu Period for Reply	ınication appears on t	ne cover sheet with the c	correspondence ad	idress			
A SHORTENED STATUTORY PERIOD WHICHEVER IS LONGER, FROM THE  - Extensions of time may be available under the provisio after SIX (6) MONTHS from the mailing date of this col  - If NO period for reply is specified above, the maximum  - Failure to reply within the set or extended period for reply reply received by the Office later than three month earned patent term adjustment. See 37 CFR 1.704(b).	MAILING DATE OF T ns of 37 CFR 1.136(a). In no e nmunication. statutory period will apply and bly will, by statute, cause the all s after the mailing date of this e	THIS COMMUNICATION event, however, may a reply be tin will expire SIX (6) MONTHS from oplication to become ABANDONE	N. nely filed the mailing date of this of (35 U.S.C. § 133).	•			
Status							
1)⊠ Responsive to communication(s) f	iled on 06 October 20	06					
2a) This action is <b>FINAL</b> .	2b)⊠ This action is						
/ <u></u>	,—						
•	closed in accordance with the practice under <i>Ex parte Quayle</i> , 1935 C.D. 11, 453 O.G. 213.						
Disposition of Claims	·						
	e application						
	Claim(s) <u>61-84</u> is/are pending in the application.  4a) Of the above claim(s) is/are withdrawn from consideration.						
5) Claim(s) is/are allowed.	_						
6) Claim(s) is/are rejected.							
7) Claim(s) is/are objected to.	istian and/or alastian	raquirament					
8)⊠ Claim(s) <u>61-84</u> are subject to restr	iction and/or election	equirement.					
Application Papers							
9)☐ The specification is objected to by	he Examiner.						
10)☐ The drawing(s) filed on is/are: a)☐ accepted or b)☐ objected to by the Examiner.							
Applicant may not request that any ob	Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).						
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).							
11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.							
Priority under 35 U.S.C. § 119							
12) Acknowledgment is made of a clair a) All b) Some * c) None of:  1. Certified copies of the priorit 2. Certified copies of the priorit 3. Copies of the certified copie application from the Internat * See the attached detailed Office act	y documents have be y documents have be s of the priority docun ional Bureau (PCT Ri	en received. en received in Applicati nents have been receive ule 17.2(a)).	ion No ed in this National	Stage			
Attachment(s)  1) Notice of References Cited (PTO-892)  2) Notice of Draftsperson's Patent Drawing Review  3) Information Disclosure Statement(s) (PTO/SB/08)  Paper No(s)/Mail Date		4) Interview Summary Paper No(s)/Mail Da 5) Notice of Informal F 6) Other:	ate				

## **DETAILED ACTION**

## Election/Restrictions

Restriction is required under 35 U.S.C. 121 and 372.

This application contains the following inventions or groups of inventions which are not so linked as to form a single general inventive concept under PCT Rule 13.1.

In accordance with 37 CFR 1.499, applicant is required, in reply to this action, to elect a single invention to which the claims must be restricted.

Group I, claim(s) 61-81, drawn to a voltage tunable photodetector.

Group II, claim(s) 82-84, drawn to an integrated thermal imager and method of operation thereof.

The inventions listed as Groups I and II do not relate to a single general inventive concept under PCT Rule 13.1 because, under PCT Rule 13.2, they lack the same or corresponding special technical features for the following reasons: The special technical feature of claim 1 is "a voltage tunable photodetector for sensing combined passive LWIR or MWIR radiation of a scene and active SWIR radiation of a laser source, comprising a quantum well infrared photodetector (QWIP) integrated together with a heterojunction bipolar phototransistor (HBPT)". The special technical feature is shown by Ryzhii et al. ("Device Model of Integrated QWIP-HBT-LED Pixel for Infrared Focal Plane Arrays") to lack novelty or inventive step and does not make a contribution over the prior art. Ryzhii et al. discloses (Abstract) a voltage tunable photodetector for sensing combined MWIR radiation of a scene and active SWIR radiation (Abstract, "into near infrared (visible) radiation") of a laser source, comprising a quantum well infrared photodetector (QWIP) integrated together with a heterojunction bipolar phototransistor (HBPT).

Applicant is advised that the reply to this requirement to be complete must include (i) an election of a species or invention to be examined even though the requirement may be traversed (37 CFR 1.143) and (ii) identification of the claims encompassing the elected invention.

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The election of an invention or species may be made with or without traverse. To preserve a right to petition, the election must be made with traverse. If the reply does not distinctly and specifically point out supposed errors in the restriction requirement, the election shall be treated as an election without traverse.

Applicant is reminded that upon the cancellation of claims to a non-elected invention, the inventorship must be amended in compliance with 37 CFR 1.48(b) if one or more of the currently named inventors is no longer an inventor of at least one claim remaining in the application. Any amendment of inventorship must be accompanied by a request under 37 CFR 1.48(b) and by the fee required under 37 CFR 1.17(i).

The examiner has required restriction between product and process claims. Where applicant elects claims directed to the product, and the product claims are subsequently found allowable, withdrawn process claims that depend from or otherwise require all the limitations of the allowable product claim will be considered for rejoinder. <u>All</u> claims directed to a nonelected process invention must require all the limitations of an allowable product claim for that process invention to be rejoined.

In the event of rejoinder, the requirement for restriction between the product claims and the rejoined process claims will be withdrawn, and the rejoined process claims will be fully examined for patentability in accordance with 37 CFR 1.104. Thus, to be allowable, the rejoined claims must meet all criteria for patentability including the requirements of 35 U.S.C. 101, 102, 103 and 112. Until all claims to the elected product are found allowable, an otherwise proper restriction requirement between product claims and process claims may be maintained. Withdrawn process claims that are not commensurate in scope with an allowable product claim will not be rejoined. See MPEP § 821.04(b). Additionally, in order to retain the right to rejoinder in accordance with the above policy, applicant is advised that the process claims should be amended during prosecution to require the limitations of the product claims. **Failure to do so may result in a loss of the right to rejoinder**. Further, note that the prohibition against double patenting rejections of 35 U.S.C. 121 does not apply where the restriction requirement is withdrawn by the examiner before the patent issues. See MPEP § 804.01.

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Any inquiry concerning this communication or earlier communications from the examiner should

be directed to SCOTT R. WILSON whose telephone number is (571)272-1925. The examiner can

normally be reached on M-F 8:30 - 4:30 Eastern.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Sue

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Purvis can be reached on 571-272-1236. The fax phone number for the organization where this

application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application

Information Retrieval (PAIR) system. Status information for published applications may be obtained from

either Private PAIR or Public PAIR. Status information for unpublished applications is available through

Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should

you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC)

at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative

or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-

1000.

srw

/Evan Pert/

Primary Examiner, Art Unit 2826